

VZCZCXYZ0000
RR RUEHWEB

DE RUEHC #1742 3021725
ZNR UUUUU ZZH
R 291704Z OCT 09
FM SECSTATE WASHDC
TO RUEHBJ/AMEMBASSY BEIJING 0000
RUEHRL/AMEMBASSY BERLIN 0000
RUEHUP/AMEMBASSY BUDAPEST 0000
RUEHBY/AMEMBASSY CANBERRA 0000
RUEHLO/AMEMBASSY LONDON 0000
RUEHMD/AMEMBASSY MADRID 0000
RUEHNE/AMEMBASSY NEW DELHI 0000
RUEHFR/AMEMBASSY PARIS 0000
RUEHWR/AMEMBASSY WARSAW 0000
INFO RUCPDO/DEPT OF COMMERCE WASHINGTON DC
RHMCSUU/DEPT OF ENERGY WASHINGTON DC
RUEKJCS/SECDEF WASHINGTON DC

UNCLAS STATE 111742

SIPDIS

E.O. 12958: N/A

TAGS: [ECON](#) [ENRG](#) [EPET](#)

SUBJECT: ASSESSING THE POTENTIAL FOR INTERNATIONAL SHALE
GAS DEVELOPMENT

¶1. This cable is an action request, see paragraph 7.

¶2. Summary: Recent technological advances in natural gas production could have a significant impact on international energy security and climate change. Natural gas from so-called unconventional sources, in particular production from hydrocarbon rich shale rock, known as "shale gas," is one of the most quickly expanding trends in U.S. oil and gas exploration, with significant international potential. The Department and Washington interagency community are working to assess the international potential for shale gas development, and where USG outreach efforts could be best directed. The Department is asking that posts assess the state of shale gas development and/or potential for development in their host country and report their findings to Washington. End Summary.

BACKGROUND

¶3. Over the past several years U.S. energy companies have been producing large amounts of gas from shale, with gas production increasing 7.5% in 2008 alone, leading the Department of Energy to increase estimates of U.S. gas reserves by 35%. While the U.S. was previously projected to import increasing amounts of liquefied natural gas (LNG), we now have a surplus of gas, with prices at record lows. LNG that would have come to the U.S. is being diverted to Europe and elsewhere.

¶4. The Washington interagency community is very interested in the potential for shale gas development internationally. On August 27 David Goldwyn, the Coordinator for International Energy Affairs, held an interagency seminar with private sector representatives to discuss the potential international impact of shale gas. Since that meeting, unconventional gas has been getting increased attention from both the energy industry and trade press. Action addressee posts are among the countries identified in an October 5 presentation by Cambridge Energy Research Associates as having the most shale gas potential outside of North America. Significant potential for production of shale gas and other forms of unconventional gas (coal bed methane and tight gas) exists abroad, and could have important implications, particularly in China and India (climate change) and Europe (energy security). Shale gas production could help both China and India meet their burgeoning energy needs, potentially displacing future coal supplies. Natural gas (with half the CO2 footprint of coal) is expected to play a vital role in meeting U.S. and global energy needs and helping ease the transition to a low-carbon economy. Shale gas exploration is underway in various countries in Europe, which could boost EU natural gas production and help Europe diversify its energy supplies. The U.S. Geological Survey is beginning to work

with foreign partners on mapping the potential of shale gas, and we are looking at how we can assist them with this work.

¶5. The key technological drivers of shale gas development have been the refinement of horizontal drilling and hydraulic fracturing technologies. Horizontal drilling is the technology which enables the drilling of non-vertical oil and gas wells that can better reach hydrocarbon bearing formations. Hydraulic fracturing is a process by which water, chemicals, and sand-like substances are pumped at high pressure into the well to "fracture" the rock and release hydrocarbons. These technologies enable industry to produce more natural gas from the shale formations economically, and with fewer disturbances to surface environments. A more thorough primer on shale gas development can be found on the DOE website at

[http://fossil.energy.gov/programs/oilgas/publications/naturalgas general/Shale Gas Primer 2009.pdf](http://fossil.energy.gov/programs/oilgas/publications/naturalgasgeneral/Shale%20Gas%20Primer%202009.pdf).

¶6. There are environmental concerns associated with shale gas that could delay its progress, mainly related to land use, water use (hydraulic fracturing uses large quantities of fresh water) and concern that production chemicals could affect groundwater. Production techniques are improving, however, and hopefully will be able to address these concerns. While these issues are being addressed, shale gas is already having profound implications for global energy markets.

ACTION REQUEST

¶7. As resources and workload permit, posts are asked to provide (via cable or email) any information they can obtain about the potential for unconventional gas development in their host country. This may simply involve querying the Ministry of Energy as to unconventional gas development in the country, but could include talking to relevant government geological research organizations or commercial energy contacts about the potential for shale gas production. If post assesses that there is no potential for unconventional gas development in the host country, no response is necessary. Please direct your response and questions to EEB/ESC/IEC Energy Officer Alex Greenstein.

SUGGESTED QUESTIONS

¶8. The below list of questions is intended as a guideline for issues that may be relevant to post reporting on shale gas development and is not exhaustive:

- Are there gas-bearing shale formations in the host country?
- Are energy companies actively exploring for shale gas?
- What kind of geologic data is available? What kind of surveys have been done to assess the presence of gas bearing shale?
- What is the regulatory environment for oil and gas development? What are the relevant host-government policies with regard to land use and water use?
- Is there sufficient infrastructure to support shale gas development? Are there international energy companies operating in-country? Is there the capacity to build and maintain drilling rigs? Are oilfield service companies active in the host country?
- What is the host country's energy mix, and what is natural gas's role? Is there significant potential for expanding natural gas utilization in the power or transportation sectors?

CLINTON